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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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3M INNOVATIVE PROPERTIES COMPANY
PO BOX 33427
ST. PAUL, MN 55133-3427

EXAMINER

NORDMEYER, PATRICIA L

13

ART UNIT PAPER NUMBER

1772

DATE MAILED: 10/20/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/929,417

Applicant(s)

RICE ET AL.

Examiner

Patricia L. Nordmeyer

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 15 September 2003.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-31 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-24 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☒ Claim(s) 25-31 are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____
- 4) ☐ Interview Summary (PTO-413) Paper No(s). _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other:

DETAILED ACTION

Withdrawn Rejections

1. The 102(b) rejection of claims 1 – 3, 7 – 9, 14 and 23 – 24 as anticipated by Eigenmann in Paper #11, Pages 2 – 3, Paragraph #3 is withdrawn due to Applicant's amendments in Paper #12.

2. The 103 rejection of claims 4 – 6, 13, 15 – 18, 21 and 22 over Eigenmann in view of Wyckoff in Paper #11, Pages 3 – 5, Paragraph #5 is withdrawn due to Applicant's amendments in Paper #12.

Repeated Rejections

3. Claims 10 – 12 are rejected under 35 U.S.C. 103(a) as being unpatentable over Eigenmann in view of Jonnes.

Eigenmann discloses the claimed pavement marking with first and second portions where the first portion contains retroreflective elements and the second portion at different height than the first portion. However, Eigenmann fails to disclose the second portion comprising retroreflective elements, at least some of the plurality of retroreflective elements being attached to a plurality of protrusions extending above and separated by a valley area within the second portion, wherein the height of the plurality of protrusions above the bottom of the pavement marking defines the second portion height, wherein the valley area in the second portion defines

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a valley height above the bottom of the pavement marking and wherein the valley height of the second portion is about equal to less than the first portion height.

Jonnes teaches a retroreflective elements (Figure 1, #15) on a rail structure at a height above the surface (Figure 1, #12) which contains valleys and protrusions to which the retroreflective elements are attached (Figure 5, #26) in a roadway lane delineator for the purpose of constructing a marker that resists removal by snow plows while having a long lasting wet reflecting capability.

It would have been obvious to one of ordinary skill in the art at the time the applicant's invention was made to have provided the retroreflective elements on the rail, or second portion, with valley formations in Eigenmann in order to construct a marker that resists removal by snow plows while having a long lasting wet reflecting capability as taught by Jonnes.

One of ordinary skill in the art would have recognized the claimed pavement marking second portion would have a height greater than the first portion since Eigenmann and Jonnes teach that the side rails protect the retroreflective elements from damage caused by snow blades and resist removal by snow plows. Therefore, one of ordinary skill in the art would readily determine the optimum height of the second portion depending on the end desired results and the absence of unexpected results.

4. Claims 19 – 21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Eigenmann in view of Wyckoff and further in view of Jonnes.

Eigenmann, as modified with Wyckoff, discloses the claimed pavement marking with first and second portions where the first portion contains retroreflective elements and the second portion at different height than the first portion. However, Eigenmann fails to disclose the second portion comprising retroreflective elements, at least some of the plurality of retroreflective elements being attached to a plurality of protrusions extending above and separated by a valley area within the second portion and wherein the height of the plurality of protrusions above the bottom of the pavement marking defines the second portion height.

Jonnes teaches a retroreflective elements (Figure 1, #15) on a rail structure at a height above the surface (Figure 1, #12) which contains valleys and protrusions to which the retroreflective elements are attached (Figure 5, #26) in a roadway lane delineator for the purpose of constructing a marker that resists removal by snow plows while having a long lasting wet reflecting capability.

It would have been obvious to one of ordinary skill in the art at the time the applicant's invention was made to have provided the retroreflective elements on the rail, or second portion, with valley formations in the modified Eigenmann in order to construct a marker that resists removal by snow plows while having a long lasting wet reflecting capability as taught by Jonnes.

One of ordinary skill in the art would have recognized the claimed pavement marking second portion would have a height greater than the first portion since Eigenmann and Jonnes teach that the side rails protect the retroreflective elements from damage caused by snow blades and resist removal by snow plows. Therefore, one of ordinary skill in the art would readily determine the optimum height of the second portion depending on the end desired results and the absence of unexpected results.

New Rejections

Claim Rejections - 35 USC § 103

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. Claims 1 – 9, 13 – 18 and 21 – 24 are rejected under 35 U.S.C. 103(a) as being unpatentable over Eigenmann in view of Wyckoff.

Eigenmann discloses a road surface marking (Column 1, lines 7 – 8) having a length and a width (Figure 3). Along the length, two marking sides, or rails, run parallel and against the sides (Column 2, lines 28 – 32). A bottom portion connects the two rails together (Figure 3, S_u). A first portion having a width smaller the width of the road surface marking is formed between the two rails (Column 3, lines 53 – 57 and Figure 3, L_e). Retroreflective elements are adhered to the first portion of the surface marking at a height less than the second portion, or rails, (Column

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4, lines 29 – 36). The second portion is at a height greater than the first portion height (Column 3, lines 40 – 46 and Figures 4 and 5, R). The retroreflective elements extend along the total length of the marking surface (Figure 3). The rails, or second portions, are formed as part of the base pavement marking (Column 3, line 68 to Column 4, line 2). The retroreflective is attached to the marker adhesively by embedding the elements into the surface (Column 3, lines 35 – 37). Since the marker is made by extrusion, it is inherent that the marker has a uniformly lightly colored appearance (Column 3, line 68 to Column 4, line 2). However, Eigenmann fails to disclose the first portion comprising a plurality of ridges having a ridge height above the bottom of the pavement marking, the ridges extending across the first portion width, the ridge height being equivalent to the second portion height, wherein the unitary retroreflective article exhibits a first color and the second portion of the pavement marking exhibits a second color that contrasts with the first color, a plurality of discrete first portions surrounded by a second portion where each of the plurality of the first portions comprising a discrete unitary retroreflective article attached thereto and the unitary retroreflective article within each of the plurality of first portions and second portions are attached to the base sheet.

Wyckoff teaches a plurality of ridges at an height above the bottom and that extend along the width of a pavement marker (Column 6, lines 25 – 28) where intermediate segments display a bright or colored appearance compared to the retroreflective segments (Column 6, lines 2 – 4) which are located on the first portions (Figure 1 and 2, #2) by an adhesive material (Column 6, lines 5 – 12) in a marker strip for the purpose of constructing a marker that has a continuous visual appearance during the daylight and a retroreflection appearance during the nighttime

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caused by automobile headlights through the use of ridges formed on the surface of the pavement marker.

It would have been obvious to one of ordinary skill in the art at the time the applicant's invention was made to have provided the plurality of ridges extending across the width of the marker at a height above the bottom of the marker in Eigenmann in order to construct a marker that has a continuous visual appearance during the daylight and a retroreflection appearance during the nighttime caused by automobile headlights through the use of ridges formed on the surface of the pavement marker as taught by Wyckoff.

One of ordinary skill in the art would have recognized the claimed pavement marking second portion would have a height greater than the first portion since Eigenmann teaches that the side rails protect the retroreflective elements from damage caused by snow blades. Therefore, one of ordinary skill in the art would readily determine the optimum height of the second portion depending on the end desired results and the absence of unexpected results.

Eigenmann discloses the claimed invention except for the unitary retroreflective article having a width that is substantially equal to the first portion width. It would have been an obvious matter of design choice to change the size of the unitary retroreflective article to have a width substantially equal to the first portion since such a modification would have involved a mere change in the size of a component. A change in size is generally recognized as being

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within the level of one of ordinary skill in the art in the absence of unexpected results. *In re Rose*, 105 USPQ 237 (CCPA 1955).

It is well settled that a particular shape of a prior invention carries no patentable weight unless the applicant can demonstrate that the new shape provides significant unforeseen improvements to the invention. See *In re Seid*, 161 F.2d 229, 73 USPQ 431 (CCPA 1947) (Claim was directed to an advertising display device comprising a bottle and a hollow member in the shape of a human figure from the waist up which was adapted to fit over and cover the neck of the bottle, wherein the hollow member and the bottle together give the impression of a human body. Appellant argued that certain limitations in the upper part of the body, including the arrangement of the arms, were not taught by the prior art. The court found that matters relating to ornamentation only which have no mechanical function cannot be relied upon to patentably distinguish the claimed invention from the prior art.) Also, see *In re Dailey*, 357 F.2d 669, 149 USPQ 47 (CCPA 1966) (the court held that the configuration of the claimed disposable plastic nursing container was a matter of choice which a person of ordinary skill in the art would have found obvious absent persuasive evidence that the particular configuration of the claimed container was significant.) In the instant case, the application does not indicate any new, significant attributes of the invention due to its shape, which would have been unforeseen to one of ordinary skill in the art. Therefore it would have been obvious to one of ordinary skill in the art at the time of the invention to change the shape of the pavement road marker to have ridges that extend along the width of the marker. One skilled in the art would have been motivated to do so in order to protect the elements from snowplows as taught by *Eigenmann*.

Response to Arguments

7. Applicant's arguments with respect to claims 1 – 9, 13 – 18 and 21 – 24 have been considered but are moot in view of the new ground(s) of rejection. However, since the same prior art is being applied in the above rejection, the arguments will be responded to below.

In response to Applicant's argument that Eigenmann fails to disclose an unitary retroreflective article, Eigenmann clearly discloses unitary retroreflective articles attached to the first portion of the pavement marker (Figures 7 – 10). Unitary is defined as "of or relating to a unit" by Merriam-Webster's Dictionary (www.webster.com). Each retroreflective articles shown in Figures 7 – 10 show the glass beads of the reflective elements as part of a unit.

In response to applicant's argument that the references fail to show certain features of applicant's invention, it is noted that the features upon which applicant relies (i.e., the retroreflective elements extending along the marking length of the roadway surface marking tape) are not recited in the rejected claim(s). Although the claims are interpreted in light of the specification, limitations from the specification are not read into the claims. See *In re Van Geuns*, 988 F.2d 1181, 26 USPQ2d 1057 (Fed. Cir. 1993). The claim language refers only to the retroreflective elements being substantially the same width as the first portion of the road marker.

8. Applicant's arguments filed in Paper #12 regarding the 103 rejection of claims 10 – 12 over Eigenmann in view of Jonnes have been fully considered but they are not persuasive.

It is well settled that a particular shape of a prior invention carries no patentable weight unless the applicant can demonstrate that the new shape provides significant unforeseen improvements to the invention. See *In re Seid*, 161 F.2d 229, 73 USPQ 431 (CCPA 1947) (Claim was directed to an advertising display device comprising a bottle and a hollow member in the shape of a human figure from the waist up which was adapted to fit over and cover the neck of the bottle, wherein the hollow member and the bottle together give the impression of a human body. Appellant argued that certain limitations in the upper part of the body, including the arrangement of the arms, were not taught by the prior art. The court found that matters relating to ornamentation only which have no mechanical function cannot be relied upon to patentably distinguish the claimed invention from the prior art.) Also, see *In re Dailey*, 357 F.2d 669, 149 USPQ 47 (CCPA 1966) (the court held that the configuration of the claimed disposable plastic nursing container was a matter of choice which a person of ordinary skill in the art would have found obvious absent persuasive evidence that the particular configuration of the claimed container was significant.) In the instant case, the application does not indicate any new, significant attributes of the invention due to its shape, which would have been unforeseen to one of ordinary skill in the art. Therefore it would have been obvious to one of ordinary skill in the art at the time of the invention to change the shape of the pavement road marker to retroreflective elements attached to protrusions and separated by a valley area in the second portion. On skilled

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in the art would have been motivated to do so in order to protect the elements from snowplows as taught by Eigenmann.

9. Applicant's arguments filed in Paper #12 regarding the 103 rejection of claims 19 – 21 over Eigenmann in view of Wyckoff and Jonnes have been fully considered but they are not persuasive.

It is well settled that a particular shape of a prior invention carries no patentable weight unless the applicant can demonstrate that the new shape provides significant unforeseen improvements to the invention. See *In re Seid*, 161 F.2d 229, 73 USPQ 431 (CCPA 1947) (Claim was directed to an advertising display device comprising a bottle and a hollow member in the shape of a human figure from the waist up which was adapted to fit over and cover the neck of the bottle, wherein the hollow member and the bottle together give the impression of a human body. Appellant argued that certain limitations in the upper part of the body, including the arrangement of the arms, were not taught by the prior art. The court found that matters relating to ornamentation only which have no mechanical function cannot be relied upon to patentably distinguish the claimed invention from the prior art.) Also, see *In re Dailey*, 357 F.2d 669, 149 USPQ 47 (CCPA 1966) (the court held that the configuration of the claimed disposable plastic nursing container was a matter of choice which a person of ordinary skill in the art would have found obvious absent persuasive evidence that the particular configuration of the claimed container was significant.) In the instant case, the application does not indicate any new, significant attributes of the invention due to its shape, which would have been unforeseen to one

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of ordinary skill in the art. Therefore it would have been obvious to one of ordinary skill in the art at the time of the invention to change the shape of the pavement road marker to retroreflective elements attached to protrusions and separated by a valley area in the second portion. One skilled in the art would have been motivated to do so in order to protect the elements from snowplows as taught by Eigenmann.

Conclusion

10. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Patricia L. Nordmeyer whose telephone number is (703) 306-

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5480. The examiner can normally be reached on Mon.-Thurs. from 7:00-4:30 & alternate Fridays.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Harold Y. Pyon can be reached on (703) 308-4251. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0661.

Patricia L. Nordmeyer
Examiner
Art Unit 1772

pln
pln

[Signature]
HAROLD PYON
SUPERVISORY PATENT EXAMINER

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10/17/03